



Early Journal Content on JSTOR, Free to Anyone in the World

This article is one of nearly 500,000 scholarly works digitized and made freely available to everyone in the world by JSTOR.

Known as the Early Journal Content, this set of works include research articles, news, letters, and other writings published in more than 200 of the oldest leading academic journals. The works date from the mid-seventeenth to the early twentieth centuries.

We encourage people to read and share the Early Journal Content openly and to tell others that this resource exists. People may post this content online or redistribute in any way for non-commercial purposes.

Read more about Early Journal Content at <http://about.jstor.org/participate-jstor/individuals/early-journal-content>.

JSTOR is a digital library of academic journals, books, and primary source objects. JSTOR helps people discover, use, and build upon a wide range of content through a powerful research and teaching platform, and preserves this content for future generations. JSTOR is part of ITHAKA, a not-for-profit organization that also includes Ithaka S+R and Portico. For more information about JSTOR, please contact support@jstor.org.

Dr. Leidy called the attention of the members to some remains of a Camel in the collection recently obtained by Dr. Hayden, from the Niobrara River, Nebraska. He exhibited the back portion of the lower jaw of the animal, which contains the true molar teeth, and possesses a hook-like process on the posterior border, as in the recent Camel; in comparison with which the extinct species appears to have been about two-thirds the size. He also exhibited, from the same collection, the fragment of a lower jaw of a species of Wolf, larger than any heretofore described.

Dr. Uhler exhibited specimens of crystallized lead, produced by withdrawing the fused interior of a cooling mass. The crystals were arranged upon rhombic bases. He also exhibited specimens of apparently fibrous or columnar lead, produced by exposing a mass when on the point of fusion, to a sudden shock. He had failed to develop any appearance of fibrous or crystalline structure upon the sawn end of a specimen by etching.

Prof. Booth remarked the resemblance of the crystals to the skeleton character seen in gold, from California and Australia. He thought the fibrous or columnar appearance not attributable to crystallization, the sides being of variable number, but due merely to cooling, or similar causes. He had observed a structure resembling this in pigs of Lake Superior copper, in nickel commercially pure, and in an alloy of nickel and copper.

Mr. Aubrey H. Smith, referring to some figures from Siam, presented by him this evening, said the stone head was from the ruined city of Juthia; the bronze figure, apparently ancient, presented still existing characteristics of the people.

January 26th.

Vice-President BRIDGES in the Chair.

Forty-five members present.

Dr. Ruschenberger read the following :—

HALL OF THE ACADEMY, January 26th, 1858.

Report of the Committee of the Academy, appointed to confer with a committee of the Biological Society, on a proposed junction of the two Societies.

Your Committee "appointed to confer with the Committee of the Biological Society of Philadelphia, with respect to the union of labors proposed in the letter of said Committee, and to report to the Academy the terms of the proposal, and also the reasons which shall appear to the Committee for or against such union," has frequently met the Committee of the Biological Society of Philadelphia, and, after free and full discussion of all the points involved, reports as follows:

The third section of the Charter of the Academy provides, that "the Society shall consist of members and correspondents," and indicates that they shall be elected individually, each being balloted for, separately. The practice of the Society since its institution in the year 1812 has been in conformity to this provision.

For this reason your Committee is of opinion that the Academy cannot, consistently with the spirit if not the letter of its Charter and By-Laws, accept any terms of union with the Biological Society, or annex any other society, or absorb any other body of men associated for analogous or identical objects, whatever might be the advantages of such union.

Your Committee might, under a literal construction of the resolution by which it was created, properly conclude this report with a recommendation that the proposition to unite the two societies be rejected. But sensible of the meritorious objects of the Biological Society, it begs the indulgence of the

[Jan.

Academy to submit briefly its views in connection with the subject, and to ask the adoption of a measure in relation to it, which, it is hoped, will be entirely acceptable to a large majority of members of both institutions.

In the language of its Charter, the Academy was instituted "for the encouragement and cultivation of the Sciences," and is "devoted entirely to the advancement of useful learning."

Nearly a half century has passed since its institution. During nearly all of this period, the cultivation of the natural sciences has been pursued objectively. It has been limited almost exclusively to the investigation of specific differences and resemblances of forms, with a view to portraying those which are new and distinguishing them from those previously described, for the purpose of appropriately classing them. The field of cultivation includes the geographical distribution of the fauna and flora of the earth, whether living or fossil; and the habits, habitat and uses of the various organisms, as well as the regular and irregular forms and chemical composition of inorganic matter. The results of the labors of the members of the Academy in this wide field, are recorded in its Proceedings and Journals.

But with the lapse of time and advancement of knowledge new fields of inquiry have been opened. To study natural sciences objectively only, no longer satisfies the disposition of man to pry into the secrets of creation. He now anxiously seeks to discover and expose the laws of organic life. He earnestly desires to distinguish primary organic cells, and to ascertain the forces and laws which bring them together, and combine them in aggregate existences, from the lowest microscopic infusoria up through the zoophytes and aculephs to the most perfect form of organization. He labors industriously to recognize the normal as well as the abnormal conditions of organic structures, wherever met on the face of the earth.

The task is Herculean, and to accomplish it in any degree worthy of consideration, the laborer requires all the sympathy and facilities which only those interested in kindred pursuits know how to accord. He needs the encouragement which flows from association with congenial spirits. He needs must be free from the disturbing influences of those who cannot or will not appreciate the objects of his researches. Such motives induce him to seek fellowship and alliance with those who are animated by a zeal analogous to his own. Hence it is that many members of the Academy, regarding objective natural history, only as the basis of the pyramid of natural science, have been drawn together; they have joined others entertaining like views, who are not in fellowship with this institution, and organized the Biological Society of Philadelphia, which is yet in its earliest infancy. Its chief property consists in the acquirements and industry and scientific zeal of its members; qualities which we should seek to retain and accumulate within the walls of this Institution.

The extensive library, and collections which are daily augmenting, are of inestimable value in facilitating the pursuits of the biologist. The Academy is pledged to assist "the advancement of useful learning" in all the departments of the natural sciences.

For the reasons alluded to, your Committee has labored assiduously to devise a measure consistent with the Charter and increasing prosperity of the Academy, which shall place all the facilities in its possession within the easy reach not only of those devoted especially to biology, but also of those who may hereafter dedicate their time and labors, particularly, to other branches, and at the same time bind together by bonds of common interest, in one harmonious union, all who are interested either partially or generally in the cultivation of the natural sciences.

For this purpose, and to meet the demands which labor is daily making for division and subdivision, in every branch of human pursuit, your Committee respectfully urges the addition of a chapter to the By-Laws, which shall provide for the creation and government of Classes or Departments, composed of members, with authority to hold meetings separately from the common meetings of the Institution, and with all the privileges necessary for the successful prosecution of their studies.

1858.]

tion of their studies ; but at the same time entirely subordinate to its Charter and By-Laws.

Under a belief that pure scientific zeal is never pretentious, and to avoid the confusion which might possibly arise from identity of appellations of different officers in the same organization, names and titles for the officers of the departments proposed have been selected with a view to practical, rather than to merely honorary distinction, which titles should be clearly indicative of subordination.

Your Committee has never been unmindful of the interests of the Academy, nor of the grave influence which the measure now recommended is calculated to exert on the prosperity of the Academy ; which is regarded to be inseparable from the advancement of science. After patiently viewing the subject in all its various aspects, it is sincerely believed that only good can accrue from amending the By-Laws as proposed. But, even should experience prove that expectation has been disappointed, the Academy may be brought back to its present organization, by repealing the By-Laws which it is now solicited to enact.

The provisions herewith submitted, it is supposed, will meet all the practical wants of scientific men devoted to the cultivation of special departments of natural history, and in this way remove every necessity for forming new societies, and in a great degree, if not entirely, annul the allurements which may be held out to members of the Academy, to labor under the fostering care of newly established organizations.

It is designed that the proceedings of the Departments shall be laid before the Academy at every meeting for business, in order that the results of their investigation may be communicated to each other, and particular information acquired by one may be made common to all. Natural history is not to be abandoned, because biologists prefer to investigate the laws of genesis and vitality, and physicists delight to examine the properties, the influences and motions of the atmosphere and of inorganic matter. The fields of entomology, ornithology, mammalogy, &c., are neither invaded nor diminished by the contemplated creation of Departments. A profitable emulation may be provoked among the members of the Academy, by the feature of the proposed organization. Therefore the interest of the ordinary meetings of the Academy may be enhanced, and the meeting for business will become more generally attractive.

The whole is respectfully submitted.

THOMAS B. WILSON,
ROBERT BRIDGES,
SAMUEL POWEL,
E. DURAND,
ISAAC LEA,
W. S. W. RUSCHENBERGER.

Whereupon the amendments to the By-Laws proposed were read, considered and passed to a second reading.

The following paper was read :—

*Hall of the Academy of Natural Sciences, }
January 26th, 1858. }*

In the event of the proposed additions and alterations of the By-Laws being agreed to by the Academy, the undersigned members request that they may be constituted the Biological Department of the Academy of Natural Sciences of Philadelphia.

Joseph Leidy, M. D.,
William A. Hammond, M. D.,
Charles F. Beck, M. D.,
J. Cheston Morris, M. D.,
James M. Corse, M. D.,

J. H. Slack, A. B.,
William Camac, M. D.,
C. S. Boker, M. D.,
S. Weir Mitchell, M. D.,
Walter T. Atlee, M. D.,

[Jan.

Edward Minturn, M. D.,
 Edward Hartshorne, M. D.,
 James Aitken Meigs, M. D.,
 Francis G. Smith, Jr., M. D.,
 Isaac Hays, M. D.,
 J. J. Woodward, M. D.,
 George R. Moorehouse, M. D.,

Benjamin H. Coates, M. D.,
 James Page, M. D.,
 B. Howard Rand, M. D.,
 Wm. Parker Foulke,
 R. Eglesfield Griffith, M. D.,
 Charles Stuart Wurts, M. D.

Which was passed to a second reading.

The election of Standing Committees for 1858 was then held, with the following result :

1. *Ethnology*, J. A. Meigs, S. S. Haldeman, T. G. Morton. 2. *Comparative Anatomy and General Zoology*, Joseph Leidy, Jas. M. Corse, Wm. H. Gobrecht. 3. *Mammalogy*, John LeConte, George A. McCall, Wm. M. Camac. 4. *Ornithology*, John Cassin, George A. McCall, S. W. Woodhouse. 5. *Herpetology and Ichthyology*, Edward Hallowell, Robert Bridges, J. C. Morris. 6. *Conchology*, T. A. Conrad, W. G. Binney, Thomas B. Wilson. 7. *Entomology and Crustacea*, Robert Bridges, F. Schafhirt, James Paul. 8. *Botany*, Elias Durand, Amable J. Brazier, S. S. Garrigues. 9. *Geology*, Isaac Lea, Charles E. Smith, John L. LeConte. 10. *Mineralogy*, Wm. S. Vaux, Samuel Ashmead, James C. Booth. 11. *Palæontology*, Thomas B. Wilson, Joseph Leidy, T. A. Conrad. 12. *Physics*, B. Howard Rand, Wm. M. Uhler, Fairman Rogers. 13. *Library*, William S. Vaux, Joseph Jeanes, Thos. B. Wilson. 14. *Proceedings*, Samuel Powel, Gideon D. Scull, J. Cheston Morris.

Catalogue and Notes of the Collection of Egyptian Antiquities in the Collection of the Academy of Natural Sciences.

BY J. H. SLACK.

No. 1. Human mummy, adult male, with sarcophagus, from Thebes. Deposited by J. L. Hodge. A remarkably fine specimen in perfect preservation.

No. 2. Mummied child from Thebes, (very rare.) J. H. Slack. "It has been a general and a just remark, that few mummies of children have been discovered—a singular fact, and one not easily accounted for, since the practice of embalming those of the earliest age was common in Egypt." Wilkinson's ancient Egyptians.

Nos. 3—14. Eleven specimens of the mummied sacred Ibis, (*Ibis religiosa*, Cuv.) from Thebes. G. R. Gliddon.

No. 15. Mummied sacred Ibis, from Sakkara. J. H. Slack. The Ibis was the most sacred bird of the Egyptians, being dedicated to Thoth, the Egyptian Mercury.

No. 16. Forty-eight specimens of mummied young crocodiles, from Thebes, (very rare.) G. R. Gliddon. The crocodile was sacred to Savak.

Nos. 17—22. Mummied serpents, from Thebes. G. R. Gliddon.

Nos. 23, 24. Mummied serpents, from Thebes. J. L. Hodge. Among the ancient Egyptians the serpent was sacred to Nuph or Chnubis, the Divine Spirit.

Nos. 25, 26. Mummied hawks, from Thebes. G. R. Gliddon. Sacred to Re.

Nos. 27, 28. Mummies, contents unknown, from Thebes. G. R. Gliddon.

No. 29. Mummied cat, from Thebes. J. H. Slack. The cat was esteemed sacred to Pasht, the Egyptian Venus.

No. 30. Mummied calf, from Thebes, (very rare.) G. R. Gliddon. Curious 1858.]

from the locality, the burial place of the god Apis, and others of the Bovine species being at Sakkara. Sacred to Osiris.

No. 31. Shawl of fine linen, such as were used to envelope the mummies of the higher classes of Egyptians, from Thebes. J. H. Slack. There has been lately discovered at Thebes an undertaker's shop, situated among the tombs on the western side of the Nile, containing over a thousand shawls, such as were used to envelope the dead, each having the price marked in one corner apparently with some indelible ink, probably the nitrate of silver: the above is one of these.

No. 32. Net work of beads and Scarabæus, from Thebes. J. L. Hodge.

No. 33. String of beads, from Thebes. Mr. T. Ryan. A net work of beads was frequently spread over the breast, and even the whole body of the mummy worked in rich and elegant devices. The winged scarabæus was placed over the breast, emblematic of the protecting influence of the Deity. (Wilkinson.)

No. 34. Fragment of bread from a mummy, (rare,) from Thebes. Mr. T. Ryan.

No. 35. Child's doll, (very rare,) from Thebes. Mr. T. Ryan. Most probably the favorite plaything of an Egyptian child.

No. 36. Ancient Egyptian ring, from Thebes. Mr. Ryan.

No. 37. Ornaments and charms, from Thebes. Mr. Ryan.

No. 38. Chess or checker-man, (very rare,) from Thebes. Mr. Ryan. In the collection of Dr. Abbott, now at New York, are two boards, with men, evidently used in playing a game similar to our checkers. This stone, resembling, in every respect, the men of the sets, doubtless belonged to a similar set. A representation of Rameses III. engaged in a game with similar pieces, is still to be seen on the wall of the palace temple of Medemet Haboo, in the Thebiad.

No. 39. Seal of a tomb, from Thebes. J. H. Slack. "Each tomb and sometimes each apartment had a wooden door, either of a single or double valve, turning on pins and secured by bolts and bars, or a lock; which last was protected by a seal of clay, upon which the impress of a signet was impressed when the party retired. Remains of the clay seal have even been found adhering to the stone jambs of the doorways at Thebes, and the numerous stamps found buried near them were most probably used on these occasions."—*Wilkinson*.

No. 40. Fragment of sculptured marble, from Thebes. Mr. T. Ryan.

No. 41. Fragment of sculptured limestone, from Karnak. J. H. Slack.

No. 42. Ancient vase, (rare) from Sakkara. J. H. Slack. This vase was found by the donor in the tomb of the God Apis near the pyramids of Sakkara.

No. 43. Ancient Egyptian sandal, from Thebes. Mr. T. Ryan.

No. 44. Offering to the manes of the dead, made in the form of some vegetable production.

No. 45. Human-headed hawk, probably from the top of a papyrus case.

No. 46. Fragment of mummy case, from Thebes. G. R. Gliddon.

No. 47. Fragment of mummy case, from Thebes. G. R. Gliddon. The God Ré is here represented seated probably in his capacity of one of the judges of the dead.

Nos. 48, 49, 50. Plaster casts, from Thebes. G. R. Gliddon. These casts were most probably taken from the walls of the tombs of Thebes; they represent offerings to the god Osiris.

No. 51. Fragment of a papyrus scroll in the demætic characters.

No. 52. A roll of papyrus in hieroglyphics, with seal attached.

No. 53. Two scarabæi, from Thebes. Mr. Ryan. The scarabæus was the most sacred emblem of the ancient Egyptians, being regarded by them as the cross is at present by some denominations of Christians.

No. 54. Figure deceased under the form of Osiris in blue glazed pottery from the Pyramids. J. H. Slack. "Small figures of wood or vitrified earthenware were common to all classes, except the poorest of the community. They usually present a hieroglyphical inscription, either in a vertical line down the centre,

[Jan.

or in horizontal bands around the body, containing the name and quality of the deceased, with the customary presentation or offerings for his soul to Osiris, a chapter from the ritual or some other funeral formula. In the hands of these figures are a hoe and a bag of seeds. Their arms are crossed in imitation of certain forms of Osiris, whose name and form the dead assumed, and the form of their beard indicates the return of the human soul, which once animated their body, to the deity from whom it emanated."—*Wilkinson*.

February 2d.

Vice President BRIDGES in the Chair.

Forty-four members present.

Dr. Leidy made some further general remarks upon the fossil mammalia obtained by Dr. Hayden from the Niobrara river (L'eau-qui-court), during the recent expedition of Lieut. G. K. Warren to explore the Black Hills of Nebraska. Dr. Hayden suspects the formation in which he discovered the fossils to be of pliocene age. The specimens belong to some twenty or more species of animals, all of which are distinct from those found in the miocene deposit of the Mauvaises Terres; and are also distinct from those of a subsequent age. The forms are, moreover, of more recent character than those of the Mauvaises Terres deposit. An interesting and remarkable fact, in connection with these remains, is that they indicate a fauna more nearly like the recent fauna of the old world, than of this country. Thus, among the remains, are those of a species of Rhinoceros, almost the same size, and having the same dental formula as the *R. indicus*. There are remains of several species of Horse, and of several new genera of ruminants; among which are those of a genus allied to the Musks, and also those of a genus closely allied to the Camel. There are, further, remains of a Porcupine, resembling the genus *Hystrix*, and those of a small species of Beaver. The collection likewise contains remains of three species of Wolf, the lower jaw of the feline genus *Pseudalurus*, fragments of several other carnivorous genera, and portions of the skeleton of the Mastodon and Elephant.

Dr. LeConte said that while he was recently in Honduras, he had examined the Mastodon bed at the village of Tambla, in one of the passes leading from the plain of Comayagua to the Pacific. He was satisfied of the identity of the remains with *M. giganteus*. He had found there a molar of Bos and two or three teeth of Equus.

On motion of Dr. Leidy, by special resolution, the thanks of the Academy were presented to Mrs. R. Pierpont, for the donation of a valuable collection of shells.

February 9th.

Dr. ISAAC HAYS in the Chair.

Thirty-three members present.

Dr. Leidy made some further general remarks upon the pliocene fossils from Nebraska; he exhibited many bones, among them the foot of a horse. He observed, that among all the mammalian remains brought by Dr. Hayden from the Niobrara river, none were more remarkable than those which he now exhibited. They belong to an equine animal which has the temporary teeth of *Anchitherium*, and the permanent teeth of *Equus*. In both these genera, the permanent and deciduous teeth are alike, but the new genus in early life is an *Anchitherium*, and later in life a true Horse.

He also exhibited the jaws, with the teeth, of a new genus allied to Oreodon, partaking, like this, of suiline and ruminant characters. The specimens were discovered by Dr. Hayden on the Niobrara, opposite Fort Laramie, and indicate a larger animal than any of the species of Oreodon described by him.

1858.]